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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.	
10/680,692	10/08/2003	Bill Askew	22567.015700.UT 6179		
22191 75 GREENBERG T	590 01/24/2001 "RAURIG. LLP	EXAMINER			
1750 TYSONS E	BOULEVÁRD, 12TH	OCHOA, JUAN CARLOS			
MCLEAN, VA 2	22102		ART UNIT	PAPER NUMBER	
		·	2123		
SHORTENED STATUTORY	PERIOD OF RESPONSE	NOTIFICATION DATE	DELIVERY MODE		
3 MON	THS	01/24/2007	FLECTRONIC		

# Please find below and/or attached an Office communication concerning this application or proceeding.

If NO period for reply is specified above, the maximum statutory period will apply and will expire 6 MONTHS from the mailing date of this communication.

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Notice of the Office communication was sent electronically on above-indicated "Notification Date" to the following e-mail address(es):

tcopatpros@gtlaw.com

Office Action Summary		Applicatio	pplication No. Applicant(s)					
		10/680,69	2	ASKEW ET AL.				
		Examiner		Art Unit				
		Juan C. Oc	hoa	2123				
Period fo	The MAILING DATE of this communication ap or Reply	pears on the	cover sheet with the c	orrespondence ad	ddress			
WHIC - Exter after - If NC - Failu Any	ORTENED STATUTORY PERIOD FOR REPL CHEVER IS LONGER, FROM THE MAILING D asions of time may be available under the provisions of 37 CFR 1. SIX (6) MONTHS from the mailing date of this communication. period for reply is specified above, the maximum statutory period re to reply within the set or extended period for reply will, by statut reply received by the Office later than three months after the mailine and patent term adjustment. See 37 CFR 1,704(b).	DATE OF TH .136(a). In no ever d will apply and will te, cause the appli	IS COMMUNICATION nt. however, may a reply be time expire SIX (6) MONTHS from cation to become ABANDONE	N. nely filed the mailing date of this of U.S.C. § 133).	•			
Status								
1)⊠	Responsive to communication(s) filed on 21 L	December 20	206					
	•	•	<del></del>					
·	This action is <b>FINAL</b> . 2b) ☐ This action is non-final.  Since this application is in condition for allowance except for formal matters, prosecution as to the merits is							
٠,١	closed in accordance with the practice under <i>Ex parte Quayle</i> , 1935 C.D. 11, 453 O.G. 213.							
Dispositi	on of Claims	•						
4)⊠	Claim(s) 1-3 is/are pending in the application.							
	4a) Of the above claim(s) is/are withdrawn from consideration.							
	5) Claim(s) is/are allowed.							
,	Claim(s) 1-3 is/are rejected.							
·	Claim(s) is/aré objected to.							
	Claim(s) are subject to restriction and/o	or election re	auirement.	•				
·	on Papers							
	•							
	The specification is objected to by the Examination drawing(s) filed on 24 December 2006 in/		contact or h\M chicat	ad to by the Even	minor			
10) ☐ The drawing(s) filed on <u>21 December 2006</u> is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.								
	Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).							
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).  11) The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.								
·		zammer. 140	ie the attached Office	7.00.011 07 10.1111 1	702.			
Priority ι	ınder 35 U.S.C. § 119		. •					
	Acknowledgment is made of a claim for foreigi ☐ All _ b)☐ Some * c)☐ None of:	n priority und	er 35 U.S.C. § 119(a)	-(d) or (f).				
	1. Certified copies of the priority documents have been received.							
	2. Certified copies of the priority documents have been received in Application No							
	3. Copies of the certified copies of the price				l Stage			
	application from the International Burea	au (PCT Rule	2 17.2(a)).		-			
* See the attached detailed Office action for a list of the certified copies not received.								
Attachmen	t(s)							
1) Notic	e of References Cited (PTO-892)		4) Interview Summary					
2) Notice of Draftsperson's Patent Drawing Review (PTO-948) Paper No(s)/Mail Date								
	nation Disclosure Statement(s) (PTO/SB/08) r No(s)/Mail Date		6) Other:	atent Application				

#### **DETAILED ACTION**

1. The amendment filed 12/21/06 has been received and considered. Claims 1–3 are presented for examination.

## Drawings

- 2. The drawings are objected to because of the following informalities:
- 3. As to Figure 1, the acronym or variable "SDR" is non–existent in the application description. The subject matter of this application admits of illustration by a drawing to facilitate understanding of the invention. No new matter may be introduced in the required drawing.
- 4. Appropriate correction is required.
- 5. The drawings are objected to as failing to comply with 37 CFR 1.84(p)(5) because:
- 6. As to Figure 1, it does not include the following reference sign(s) mentioned in the description: 100.
- 7. As to Figure 1, paragraph [0013], line 11 of the specification refers to "payload 110" and not "Cargo PC 110" as labeled in Figure 1.
- 8. Corrected drawing sheets in compliance with 37 CFR 1.121(d), or amendment to the specification to add the reference character(s) in the description in compliance with 37 CFR 1.121(b) are required in reply to the Office action to avoid abandonment of the

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application. Any amended replacement drawing sheet should include all of the figures appearing on the immediate prior version of the sheet, even if only one figure is being amended. Each drawing sheet submitted after the filing date of an application must be labeled in the top margin as either "Replacement Sheet" or "New Sheet" pursuant to 37 CFR 1.121(d). If the changes are not accepted by the examiner, the applicant will be notified and informed of any required corrective action in the next Office action. The objection to the drawings will not be held in abeyance.

# Claim Objections

9. Claims 1 and 3 use the acronym or variable "MDM IOM", the first use of an acronym or variable in a claim should be defined to avoid any possible indefiniteness issues. Examiner notes that MDM is not elaborated in the application description (see application description page 4, paragraph [0017], line 1) and that IOM is non–existent in the application description.

## Claim Rejections - 35 USC § 112

- 10. The following is a quotation of the second paragraph of 35 U.S.C. 112:

  The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.
- 11. Claim 3 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant regards as the invention.

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12. Regarding claim 3, the phrase "such as" renders the claim indefinite because it is unclear whether the limitations following the phrase are part of the claimed invention.

See MPEP § 2173.05(d).

# Claim Rejections - 35 USC § 102

13. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –
(b) the invention was patented or described in a printed publication in this or a foreign country or in public use or on sale in this country, more than one year prior to the date of application for patent in the United States.

- 14. Claims 1–3, are rejected under 35 U.S.C. 102(b) as being anticipated by Barry, (Barry hereinafter), Space Shuttle Payload Customer Support Tools: Orbiter-in-a-Box.
- 15. As to claim 1, Barry discloses a system for accurately predicting payload performance at a location remote from an intended launch vehicle or it's associated computer controls (see page 278, col. 2, Fig. 1), comprising: a.) A Mission Operations Tool for collecting information for payload operations products and support (see page 278, col. 2, 5<sup>th</sup> paragraph); b.) An Orbiter-in-a-Box Tool portable in nature and having an embedded real–time model of launch vehicle avionics on a Cargo PC (see page 278, col. 1, 2<sup>nd</sup> paragraph, lines 7–10) capable of emulating the launch vehicle environment (see page 277, col. 1, 3<sup>rd</sup> paragraph); c.) A Command and Data Tool for creating command and data tables to facilitate communications with the Orbiter-in-a-Box (see page 278, col. 2, 3<sup>rd</sup> paragraph); d.) A General Purpose Emulator enabling payload customers to create and test mathematical model of their payload capable of use in

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crew training and vehicle simulations on manned flights (see page 278, col. 2, 4th paragraph), and a custom designed board to provide shuttle MDM IOM electrical interface to the payload (see page 279, col. 2, 2<sup>nd</sup> paragraph, lines 7–12).

- 16. As to claim 2, Barry discloses a system further comprising a Shared Data Repository (see page 280, col. 1, next to last paragraph, last 4 lines) wherein data for a plurality of payloads from a Cargo PC (see page 280, col. 1, next to last paragraph, lines 2–6) may be uploaded to a shared server to enable a launching agency to integrate such data into a model of intended payloads for a particular flight (see page 280, col. 2, next to last paragraph, last 6 lines).
- 17. As to claim 3, Barry discloses a method for accurately predicting payload performance at a location remote from an intended launch vehicle or its associated computer controls, comprising: a.) Distributing portable systems such as is described in claim 1 to payload customers (see page 278, col. 1, 3<sup>rd</sup> paragraph, lines 6-7) for operation on a Cargo PC (see page 280, col. 1, next to last paragraph, lines 2–6); b.) Allowing input from said customers concerning customer payload(s) (see page 278, col. 1, 3<sup>rd</sup> paragraph, lines 10–13); c.) Processing said data to form a data set capable of integration by a launching agency to form an accurate and integrated model of intended payloads (see page 278, col. 1, last paragraph and col. 2, 1st paragraph), and d.)

  Designing a custom shuttle MDM IOM electrical interface for connection to the customer's payload (see page 279, col. 2, 2<sup>nd</sup> paragraph, lines 7–12).

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## Response to Arguments

- 18. Applicant's arguments filed 12/21/06 have been fully considered but they are not persuasive.
- 19. Regarding the specification objections, the amendment corrected all deficiencies and the objections are withdrawn.
- 20. Regarding the rejections under 112 second paragraph, claim 3 remains defective because the term "such as is described in claim 1" remains. Applicant argues, (see 5, 4<sup>th</sup> paragraph), that "Claims 1, 2 and 3 are now distinct". Examiner confused as how this cures claim 3's deficiency.
- 21. Regarding the rejections under 102, Applicant's arguments have been considered. Examiner has further elaborated the amended limitations disclosures in the instant rejection.
- 22. Therefore it is the Examiners position that does anticipate the independent claims and the rejections are maintained.

#### Conclusion

23. Applicant's amendment necessitated the new ground(s) of rejection presented in this Office action. Accordingly, **THIS ACTION IS MADE FINAL**. See MPEP § 706.07(a). Applicant is reminded of the extension of time policy as set forth in 37 CFR 1.136(a).

A shortened statutory period for reply to this final action is set to expire THREE MONTHS from the mailing date of this action. In the event a first reply is filed within

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TWO MONTHS of the mailing date of this final action and the advisory action is not mailed until after the end of the THREE-MONTH shortened statutory period, then the shortened statutory period will expire on the date the advisory action is mailed, and any extension fee pursuant to 37 CFR 1.136(a) will be calculated from the mailing date of the advisory action. In no event, however, will the statutory period for reply expire later than SIX MONTHS from the date of this final action.

- 24. Examiner would like to point out that any reference to specific figures, columns and lines should not be considered limiting in any way, the entire reference is considered to provide disclosure relating to the claimed invention.
- 25. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Juan C. Ochoa whose telephone number is (571) 272-2625. The examiner can normally be reached on 7:30AM 4:00 PM.
- 26. If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Paul Rodriguez can be reached on (571) 272-3753. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.
- 27. Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should

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you have questions on access to the Private PAIR system, contact the Electronic

Business Center (EBC) at 866-217-9197 (toll-free).

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PAUL RODRIGUEZ

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UPERVISORY PATENT EXAMINER